

Memoranda



~~ADP~~  
ADP  
CP  
9/3/68  
Done

D. Pearson  
Howland Is

12 July 1966

Sooty Returns  
for

July 12

July 13

July 15

D. Pearson

~~Bands received~~

~~12 July 1966~~

~~953-01501-02500~~

~~bands returned unused~~

~~953-01801-02500~~





12 July 1966

Sooty Tern banding (adult)



Sooty Tern returns  
12 July 1966

✓ ADP

~~843-3415~~ 1e ✓  
~~55013~~ 1y ✓  
~~37395~~ S ✓  
~~35553~~ 1y ✓  
~~35636~~ 1e ✓  
~~37521~~ S ✓  
~~37050~~ 1y ✓

---

793-419572 1y ✓  
~~47919~~ 1e ✓  
~~43496~~ S ✓  
~~49584~~ 1y ✓  
~~45070~~ S ✓  
~~30348~~ S ✓  
~~44205~~ 1y ✓  
~~48021~~ 1e ✓

y = chick  
e = egg  
S = sitting

Sooty Tern returns  
12 July 1966

~~773-25816~~ 1y ✓  
~~21653~~ S ✓  
~~24410~~ S ✓  
~~26594~~ 1e ✓  
~~21533~~ S ✓



collet 723-  
61001-61600



13 July 1966  
Howland Is. Survey

ad ( nests: BFB

[illegible]

~~Brown Booby~~

$$\begin{array}{r} 1 \\ 230 \\ 162 \\ 247 \\ \hline 639 \end{array}$$
$$\begin{array}{r} 41 \\ 22 \\ \hline 255 \end{array}$$
$$\begin{array}{r} 68 \\ 19 \\ \hline 87 \end{array}$$



13 July 1966

D. Pearson

Hawland Is.

Sooty Tern Adults

Bands received

953-07901 - 08000

(100)

953-01801 - 0,2000

(200)

953-02801 02900

(100)

bands returned

953-01801 - 01900

Howland Is. 13 July 1966

Sooty Tern returns

773-21321-S ✓

22312-S ✓

22312(e) ✓

25962-S ✓

24598-S ✓

27585-S ✓

27007(e) ✓

21188(e) ✓

23138(e) ✓

Howland Is. 13 July

Sooty Tern returns

843-36674(e) ✓

38276(e) ✓

37915-S ✓

35659(e) ✓

37105(e) ✓

38605(e) ✓

---

823-01956(e) ✓

793-45355-S ✓

43703-S ✓

46218(e) ✓

44249(e) ✓

44190(e) ✓

49415(e) ✓

48022-S ✓

46463-S ✓



Howland Is.  
15 July 1966

P. Pearson  
Sooty Terns ad.

bands received  
953-09001-10,000

Planned number  
953 - 09001  
09500

Paint

17 / 100

13 / 100

7 / 100

2 / 100

5 / 100

Howland Is. 15 July

Sooty Tern veterans

773-25241 (C) ✓

29808 (BP) ✓

27146 (C) ✓

29314 (BP) ✓

29627 ✓

793-43488 (1/2 BP) ✓

48923 (chick) ✓

46002 (no BP) ✓

43436 ✓

46632 ✓

48846 ✓

Howland Is. 15 July 1966  
Alcorno

843 - 55330 - S ✓  
38995 - S ✓  
38882 - S ✓  
55043 - BP ✓

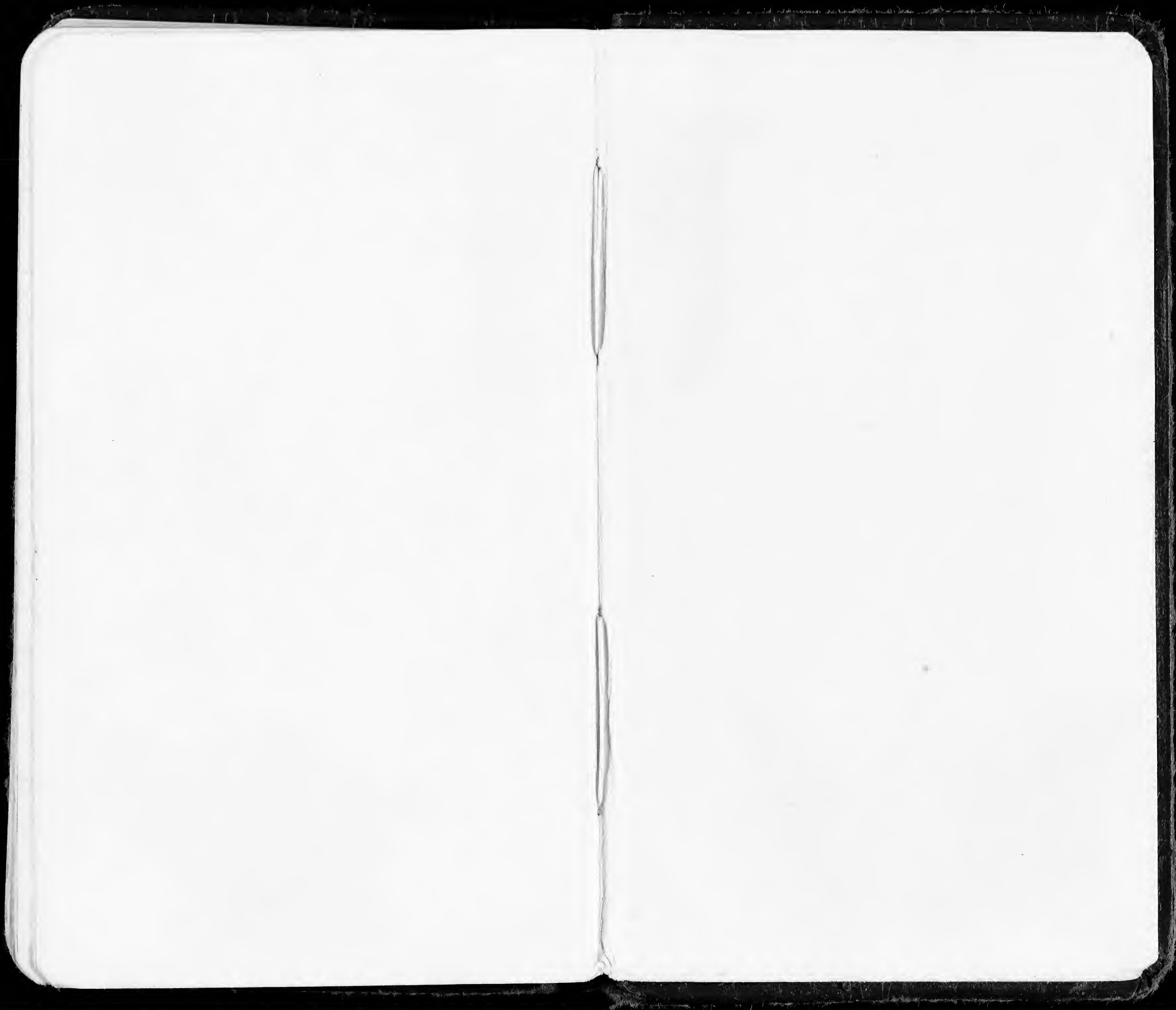














7530-222-0078  
FEDERAL SUPPLY SERVICE



HOWLAND

Memoranda

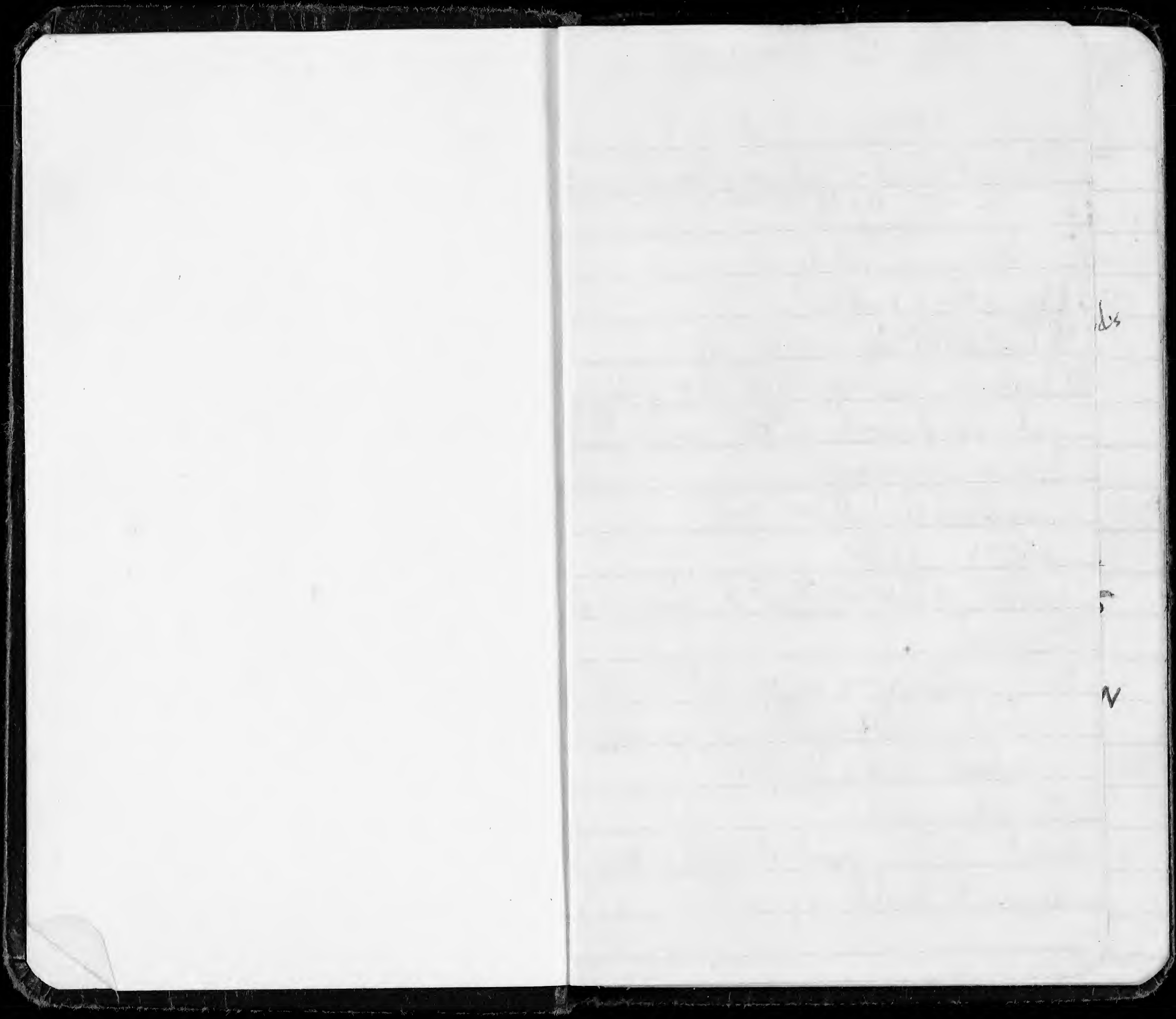


1966  
✓ ADP  
Done 9/2/68

HOWLAND ISLAND  
PACIFIC OCEAN  
POBSP  
12 JULY →  
RW SCHREIBER

Sooty Returns  
for

July 12  
July 13 14  
July ~~14~~ 15  
July 17  
July 18  
July 19





Hermit crabs - turn over tree stump &  
in area 6 x 1 1/2 feet counted 67 crabs

shark

R~~at~~ other crabs

~~W.T.~~ TROPICBIRDS - saw 11

B.F. boobies ~~is~~ scattered along edge  
of island mostly to ~~SE~~ <sup>SE</sup>? counted 497  
(gross) 5  
ch  
or 150000

Blue-gray NODDY

Wandering Tattler (coll)

SOOTY TERN

LESSER FRIGATES - ♂ ♂ white underwing

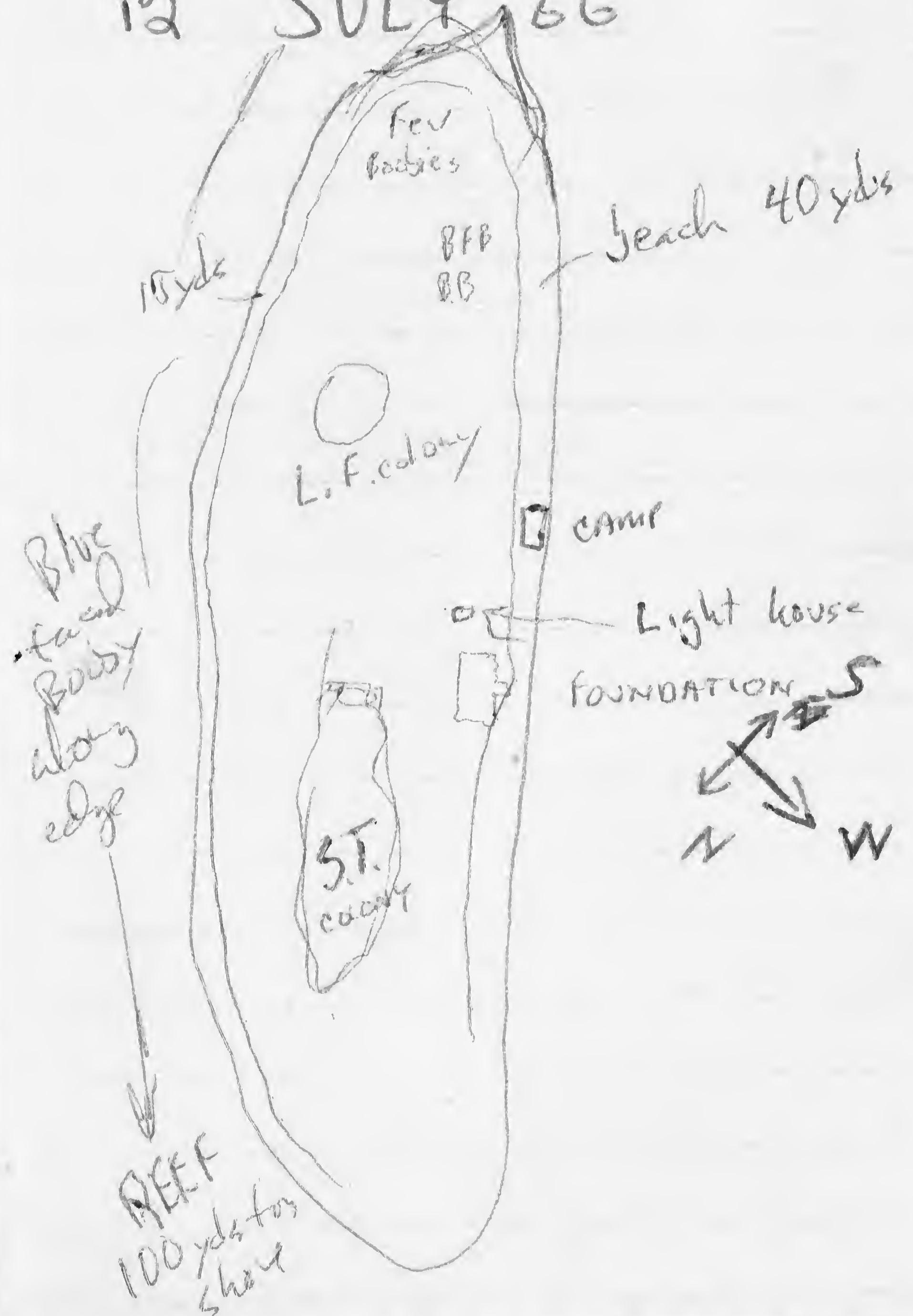
ST. colony on eggs - at end  
chicks (10+) other end eggs  
~~2~~ chicks (1-10)

8 Golden plovers

About 1530 swirl of sooty terns  
begins to build up

# HOWLAND IS

## ISLAND SURVEY SCHREIBER + HUBER 12 JULY '66



HOLLAND

✓ ADP

~~RETURNS:~~ RECOVERY

~~737-39672~~

✓ BLUE STREAMER

BANDS

RECEIVED

12 JULY

12 JULY

953-03501 → 04500

BANDS USED 953-035001 → 953-04000

✓ returned 953-04001 → 04500

13 JULY

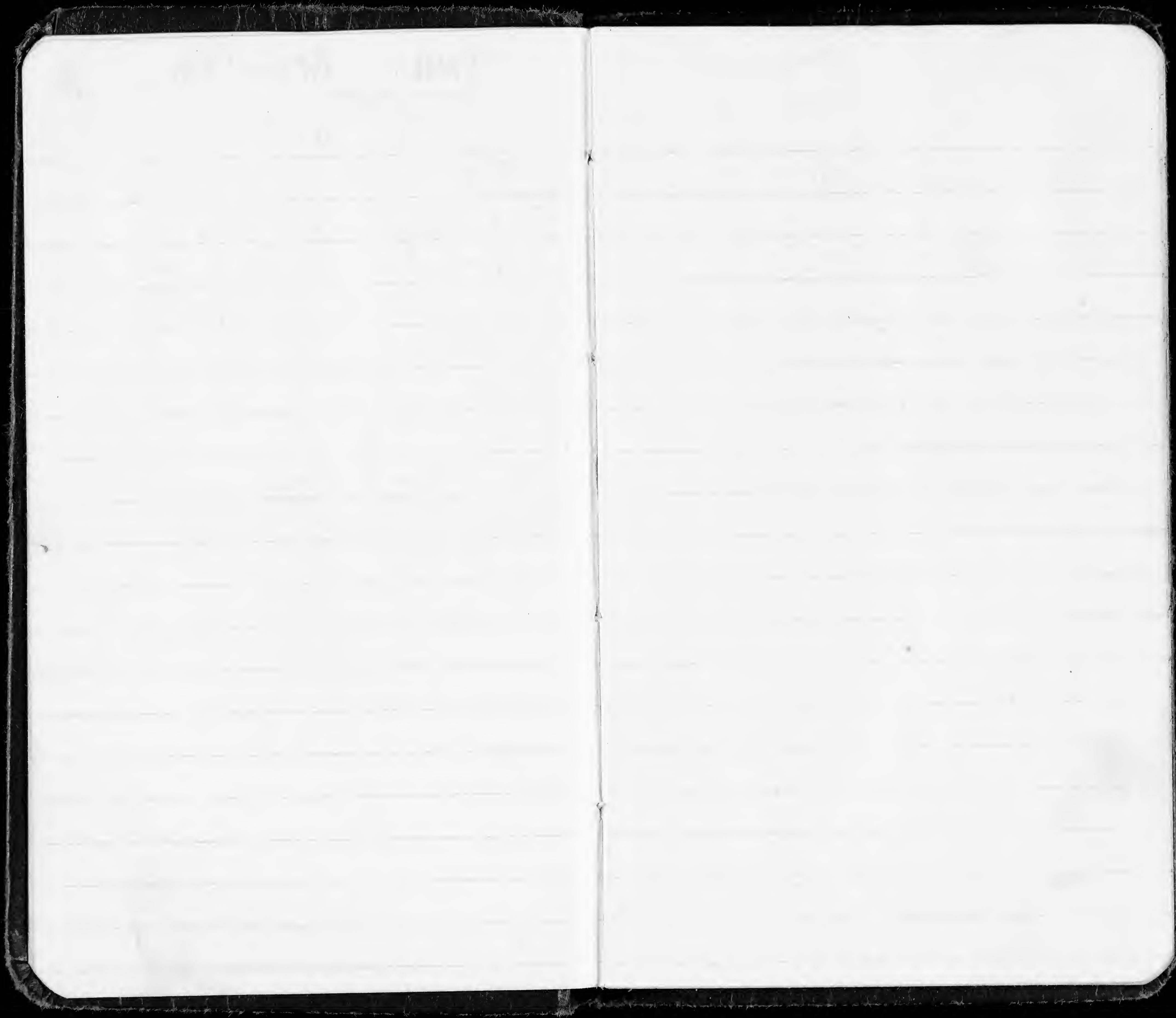
953-00501 → 01000

15 JULY

~~953-10001 → 110,500~~

953-10,501 → 11,000 received





HOWLAND

~~12 JULY 1966~~

~~SOOTY TERN BANDING ADULT~~

~~953-03501 → 04000~~

---

723-61001  
61600

RECOVER !



12 JULY '66

SOOTY TERN RETURNS

~~793-72732 oe~~  
~~43541 oe~~  
~~44698 wch~~  
~~46613 wch~~  
~~44713 wch~~  
~~44718 wch~~  
~~44823 ?~~  
~~44287 wch~~  
~~44317 wch~~  
~~47193 oe~~  
40741 oe  
~~43630 ch~~

~~843-37282 noe or ch~~  
~~55257 oe~~  
~~55021 oe~~  
~~35618 oe~~  
~~37894 ?~~  
~~36581 ch~~  
~~38432 ch~~

~~30298 ?~~  
~~45460 ch~~  
~~49530 ch~~  
~~47550 ?~~  
~~49291 ch~~  
~~30215 ch~~  
~~45138 ch~~

12 JULY 66

SOOTY TERN RETURNS

~~773-26785 oe~~  
~~29649 oe~~  
~~21015 oe~~  
~~29373 ?~~  
~~25807 ?~~  
~~29072 ?~~  
~~29434 ch~~  
~~20072 ?~~  
~~23420 ch~~  
~~24688 ch~~  
~~23084 ?~~  
~~26950 ?~~  
~~21067 ch~~  
~~24680 ch~~







13 JULY

SOOTY TERN BANDING

953-00501 → 01000

13 JULY

HOWLAND -

SOOTY TERN RETURNS

843-

~~36863?~~

~~55824 ge~~

~~36876?~~

~~35164 ve~~

~~38300 ch~~

~~55181 ch~~

~~36949?~~

~~37233 ch~~

~~36095 ch~~

~~29714 ch~~

~~20286 ch~~

~~18557 o ch~~

773-21736

~~ge~~

~~22481?~~

~~26824?~~

~~28551?~~

~~21580 ch~~

793-

~~45346 ve~~

~~48777 ve~~

~~48377 ve~~

~~30084 ve~~

~~49559 o ch~~

~~48744 ch~~

~~44270 ch~~

~~72937 ch~~

~~47815?~~

~~47752?~~

~~30729?~~

~~43848 ch~~

~~30167 ch~~

~~45600~~

~~43857?~~

~~30716 ch~~

~~48102 ch~~

~~45665?~~

14 JULY

SOOTY TERN RECOVERY

863-81519

blue steamer ✓

793-48486

" "

✓

BAND DESTROYED

953-01975



✓

JUNE

BORITAVIA

RETURNS

SOOTY TERN

~~BANDING~~ ADULTS

773-26201 oc

~~24232 ?~~

~~(04079 ch)~~

~~26418 ch~~

26372 ch

23074 ch

21645

25367

26862

21351 ch

24091

27019

27020 oc

843-37874

~~45474~~

38666 oc

25953

37181

35911

76677 BF

79372978 ch

~~43757 ?~~

~~44487 ?~~

30548

47337

39707

39698

72877

72620

30507 ch

15 JULY

SOOTY TERN NESTING

TRIBULUS  
+ high grass  
clumps

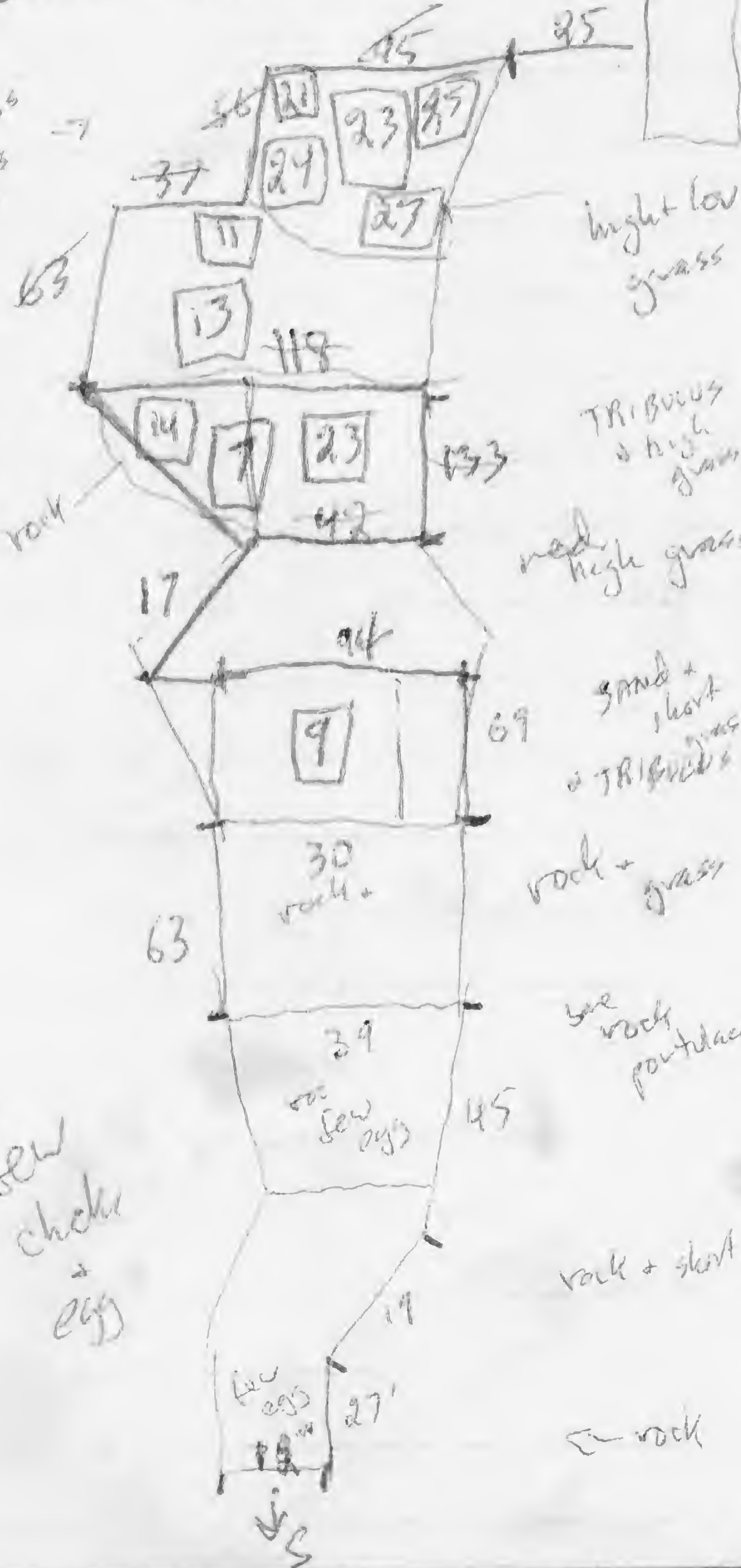
163

chicks  
+ eggs rock

↓

370

few  
chicks  
+ eggs



= chicks  
(10+)  
(20+)

most  
dense  
TRIBULUS

32  
rock

chick  
10+

AND

chick  
107  
29

70



15 JULY

SOOTY TERN BANDING

953-10001 ~~10,500~~  
10,501 → 11,000

15 JULY ✓ ADP

SOOTY TERN RETURNS:

792-44712 BP ✓  
28575 BP ✓  
44911 BP ✓  
47778 BP ✓  
49704 BP ✓  
43731 BP ✓  
44327 BP ✓  
46372 BP ✓  
30751 BP ✓  
30372 BP ✓  
72598 ✓  
46032 ✓  
43758 ✓  
45516 ✓  
44753 NO BP ✓

783-20440 BP ✓  
22032 BP ✓  
24047 BP ✓  
37760 BP ✓  
29019 ch ✓  
26963 BP ✓  
27243 BP ✓  
26576 BP ✓  
29238 ✓  
46262 ✓

843-35023 BP ✓  
37144 ch ✓  
37133 BP ✓  
35103 ✓



11

17 JULY  
HOWLAND IS

S.T. BANDING

953-13601 → 13700 CHICKS

953-13701 → 13800 CHICKS

953-14001 → 14500 ADULTS

14501 → 15000 ADULTS

18/45

WATCH BFB BOOBY - Adults on return  
from somewhere, often on nest - head shake  
sideways, return turns back on nest,  
walk around shaking head & giving high  
pitch peep-peep sorta sound, some wing  
raising with shaking of head, also point  
towards wing/shaking & head semi horizontal  
bill slightly up, head often alert posture  
or withdrawn, preening under wing &  
also at back, body shaking & tail wagging  
RITUAL OF NEST CHANGEOVER.

17 JULY

~~HASLAND~~

~~S.T. RETURNS~~

Between 1910 + 1915 count 285  
ST returning from direct west is a  
steady stream along corridor toward  
the colony, little call, direct flight  
at sunset 10:50 - Correlate  
to sunlight - directly to colony, how  
know where it is.

ALSO 6 BFB adults landed in <sup>obs</sup> ~~gap~~  
on beach ~~some~~ to giving  
stream continued, but  
not noticed when began

fly in  
imm return to nest - bill clapping &  
wing spread to adult, sideways  
walking



Reef fish - sort - drops off  
to unknown depth - like Seigora  
top of cliff on this island -  
how deep?

17 JULY

ST RETURNS

✓ADP

773- ~~27483~~ oe ✓  
~~20767~~ oe ✓  
~~29595~~ oe ✓  
~~24582~~ ch ✓  
~~21470~~ ch ✓  
~~24854~~ ch ✓

793- ~~47548~~ oe ✓  
~~72826~~ oe ✓  
~~49735~~ oe ✓  
~~48749~~ oe ✓  
~~44213~~ ch ✓  
~~46247~~ ch ✓  
~~48012~~ ch ✓

843- ~~55075~~ oe ✓  
~~36983~~ ch ✓  
~~35852~~ OP ✓  
~~55077~~ oe ✓  
~~55177~~ OP ✓  
~~39441~~ oe ✓  
~~37941~~ ch ✓  
~~35695~~ ch ✓  
~~37466~~ ch ✓

~~BROWN~~

18 JULY

DOOBY Feeding habits

Flying fish - red fin  
clear fin  
black fin

BB- ♂ blue eye wing  
♀ spot in front of eye  
veef feelers  
leave nest much faster than RFB

ST ♂ & ♀ weight diff.  
too small nervous?

18 JULY  
HOWLAND -  
ST RETURNS ✓ ADP

~~773-22208 oe ✓~~  
~~24278 ch ✓~~  
~~29415 BP ✓~~  
~~39518 BP ✓~~  
~~242170P ✓~~  
~~24375BP ✓~~

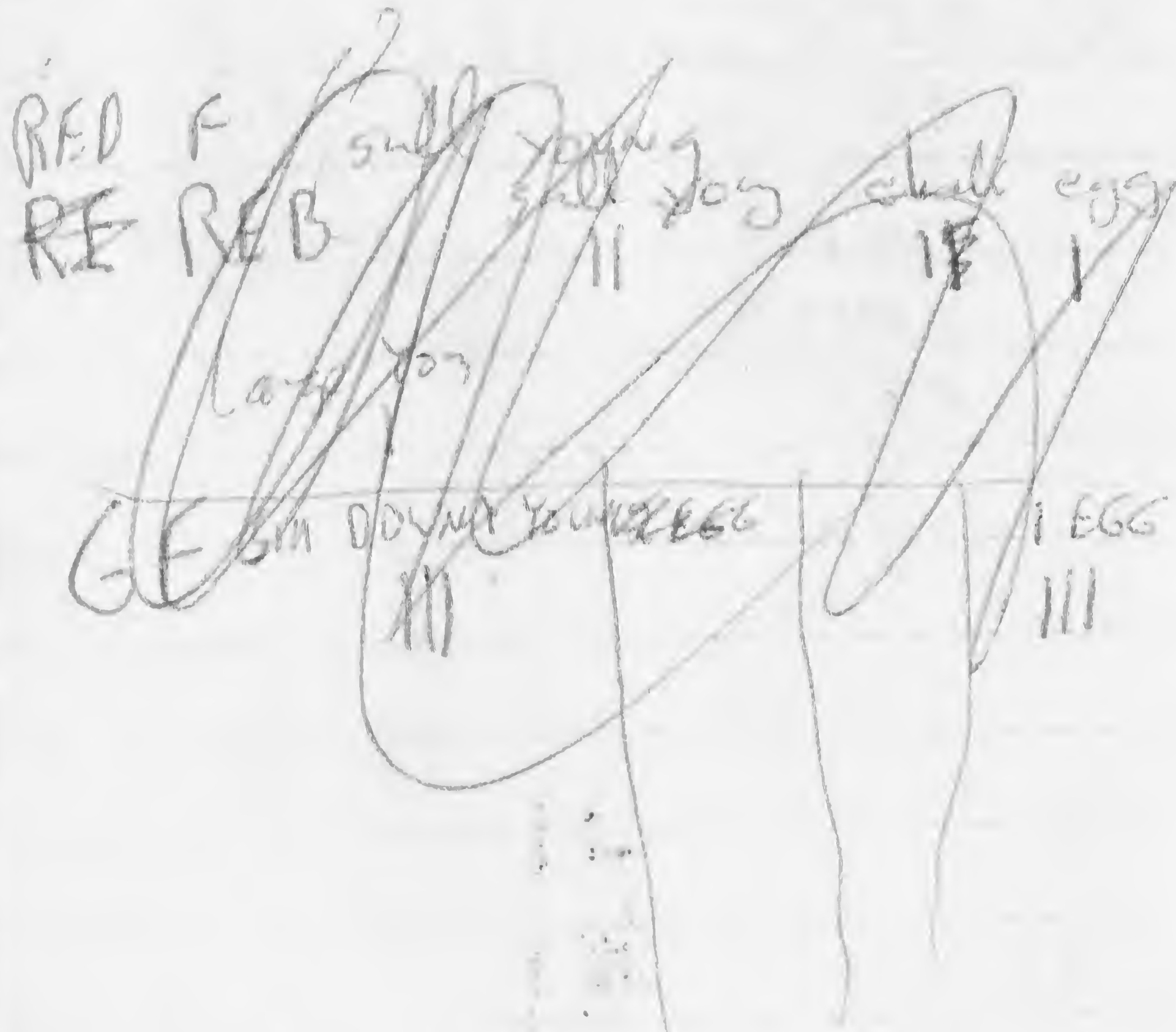
~~843-37419 oe ✓~~  
~~38158 BP ✓~~  
~~35663 BP ✓~~  
~~36046 BP ✓~~  
~~38524 " ✓~~  
~~?~~

~~793-4550 oe ✓~~  
~~44705 BP ✓~~  
~~48358 BP ✓~~  
~~39989 BP ✓~~



19 JULY

CENTRAL CAROLIA GROVE  
RT TROPICBIRD small downy chicks



Sub adults - 144  
Sub ad - white  
head

RFB chicks in hot sun  
hanging over

	NAKED	DOWNY small chick	DOWNY med ch	EGG
GF	III	IIII	IIII	IIII
	II	IIIIII	IIIIII	IIIIII
	II	II III	II	II III
				II III

GF 2 small downy young  
lesser ♀ on 2 eggs  
small young med young

RFB	IIII	IIII	IIII
NAKED YOUNG			
III			

TOTALS	EDGING NAKED	DOWNY small	DOWNY MED-LARGE	EGG	
Great F	15	34	27	58	134
RFB	3	6	10	8	27
RFBRTTB		1			1



19 JULY

HOWLAND

BROWN BOOBY

identifying  
chicks?

Build nest - Portulaca?  
(BFB nest)

One fresh track for BFB on BFB

not sun 1600 wind SE

10 40 yds 28 yds from ch  
50 17 yds downwind  
1 egg 2 egg 4 all chicks 3 egg

II III II  
1 clutch 2 RUMTS

FD - 13 yds from egg downwind  
upwind 6-8 yds 28 yds

imm 3 4

? chicks / 4

Stake the island

hermit crabs - eat end of the  
shell out on sand  
under rock hiding?

PORTUNIDAE

swimming crabs



19 JULY

HOWLAND

✓ADP

ST Returns

793-48874 BP ✓

25460 BP ✓

44428 oe ✓

44423 ch ✓

45874 ch ✓

47129 ch ✓

47202 ch ✓

49297 BP ✓

47554 BP ✓

753-67679

577-27069 ch ✓

28835 BP ✓

28509 BP ✓

24196 BP ✓

25452 BP ✓

24677 oe ✓

30925 oe ✓

29068 BP ✓

26371 ch ✓

23149 BP ✓

29375 BP ✓

29225 BP ✓

28781 oe ✓

27077 BP ✓

843-35245 BP ✓

35293 BP ✓

35104 BP ✓

35546 oe ✓

36616 oe ✓

38719 ch ✓

38976 BP ✓

36597 ch ✓

35011 ch ✓

36875 ch ✓

38490 BP ✓

55259 BP ✓

35248 oe ✓

37005 ch ✓

37065 BP ✓

55693 BP ✓

37840 BP ✓

36949 BP ✓

55653 ✓

35793 ✓

36035 BP ✓

35476 oe ✓

19 JULY

ST Returns

✓ADP

793-45171 BP ✓

44464 BP ✓

48157 BP ✓

47773 BP ✓

45932 BP ✓

46147 BP ✓

44517 BP ✓

72938 ✓

72687 ✓

30711 ✓

48760 ✓

72795 oe ✓

44805 BP ✓

48007 BP ✓

43734 oe ✓

43345 BP ✓

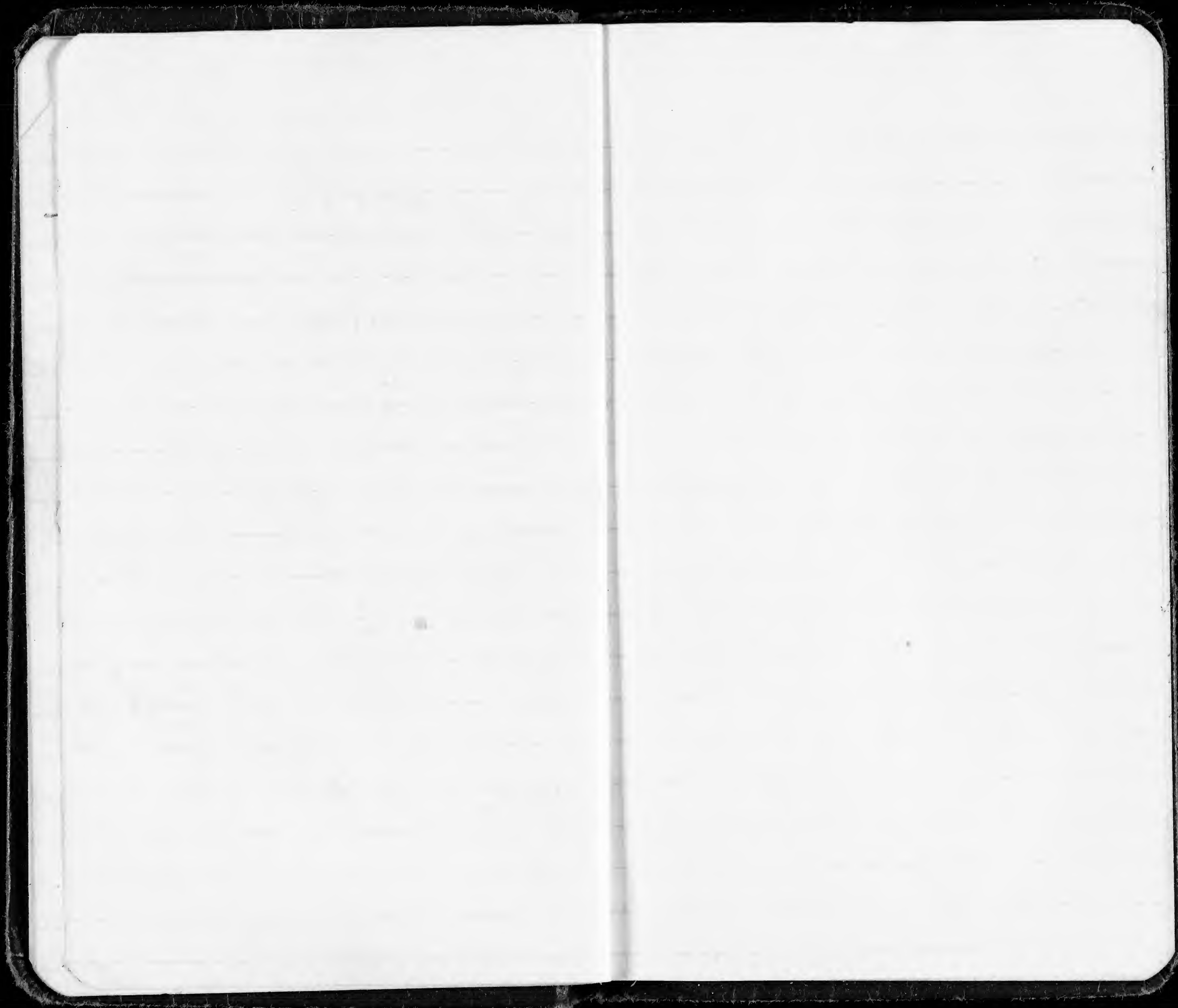
823-01765 BP ✓

✓329711 ✓

✓25866 ✓

✓30059 ✓

✓29972 ✓















7530-222-0078

FEDERAL SUPPLY SERVICE



*Memoranda*



WALT BULMER

BAKER ISLAND

✓ ADP  
C B K  
Done 8/17/68

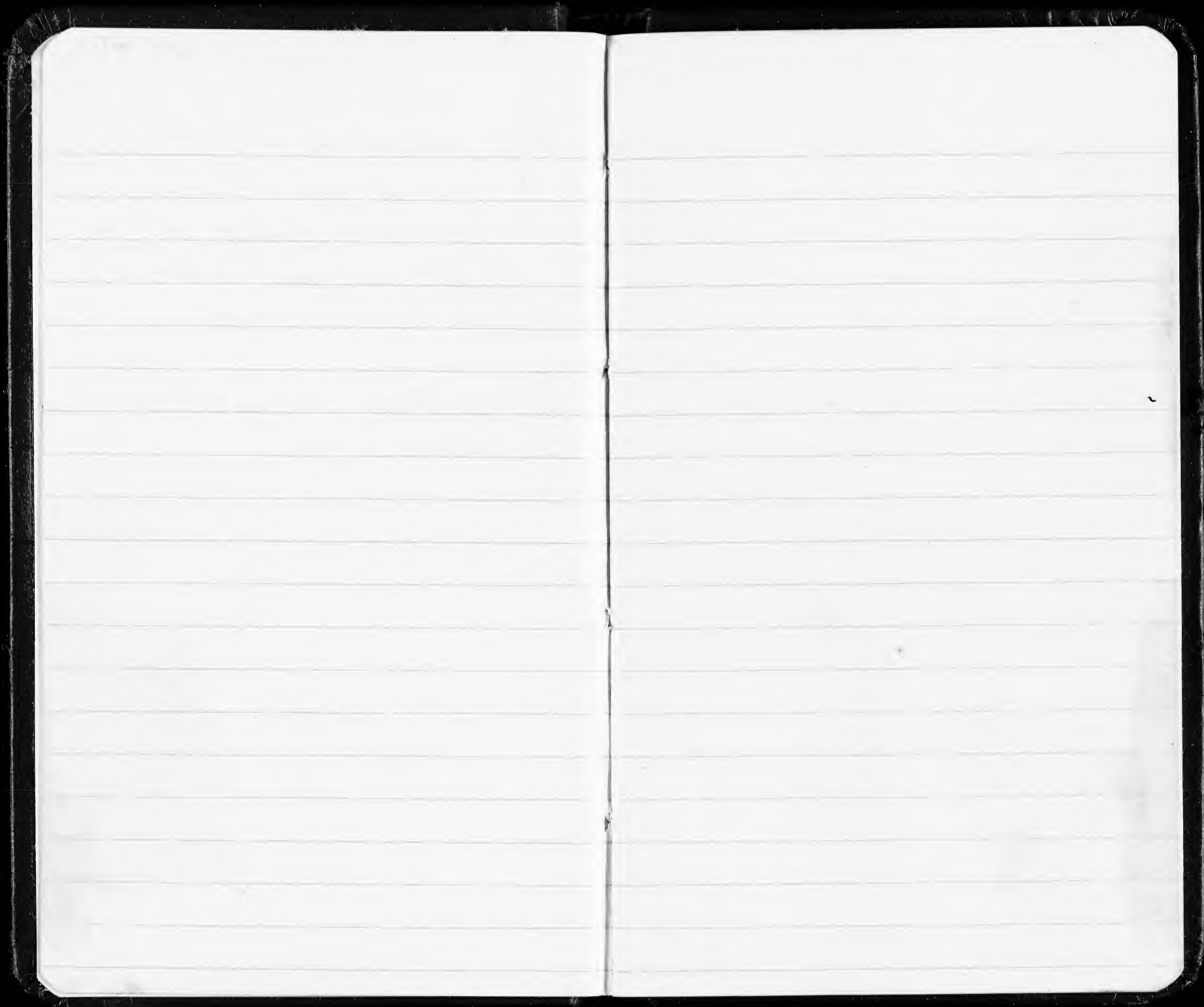


12 JULY, 1966

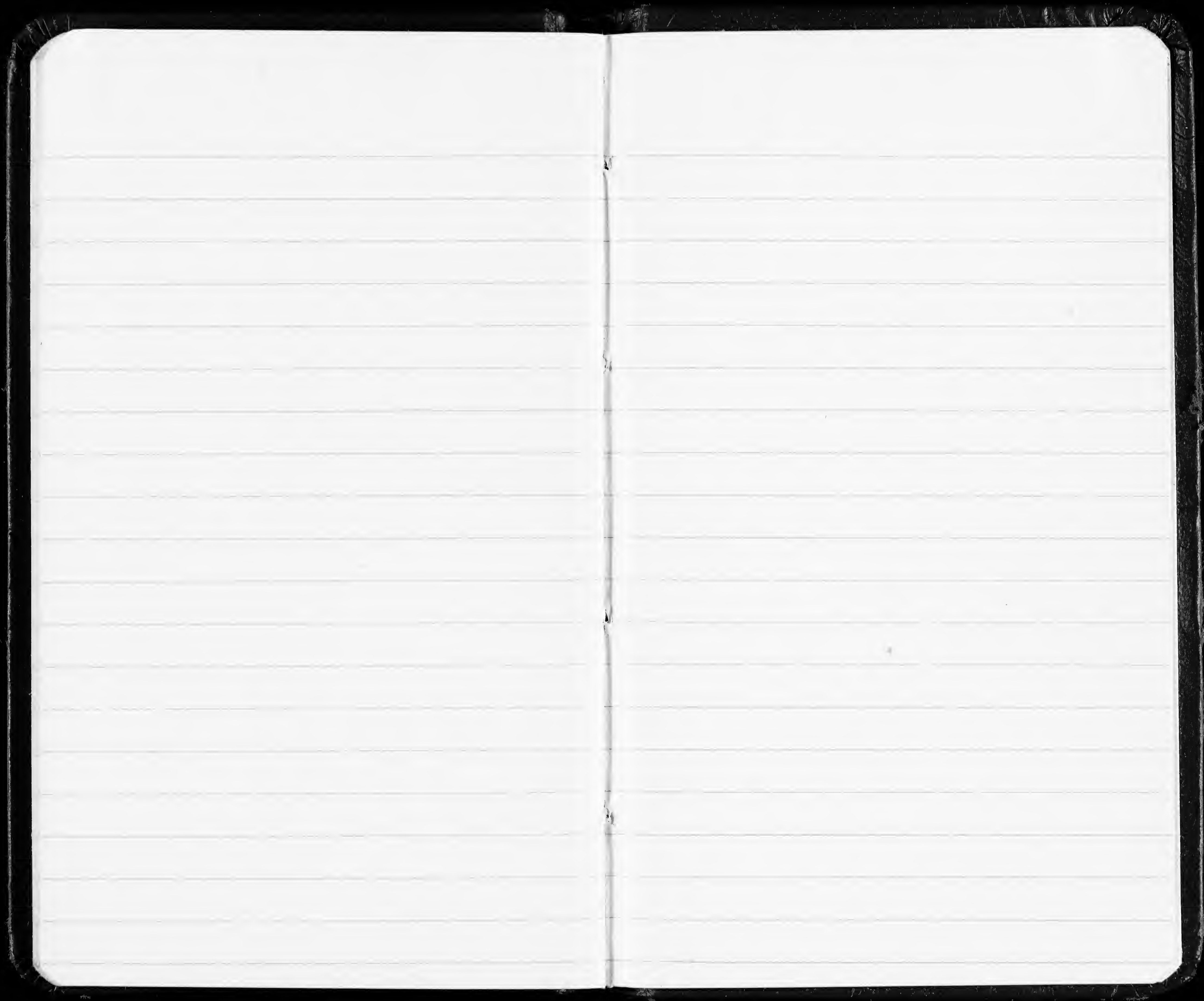
~~Greater~~

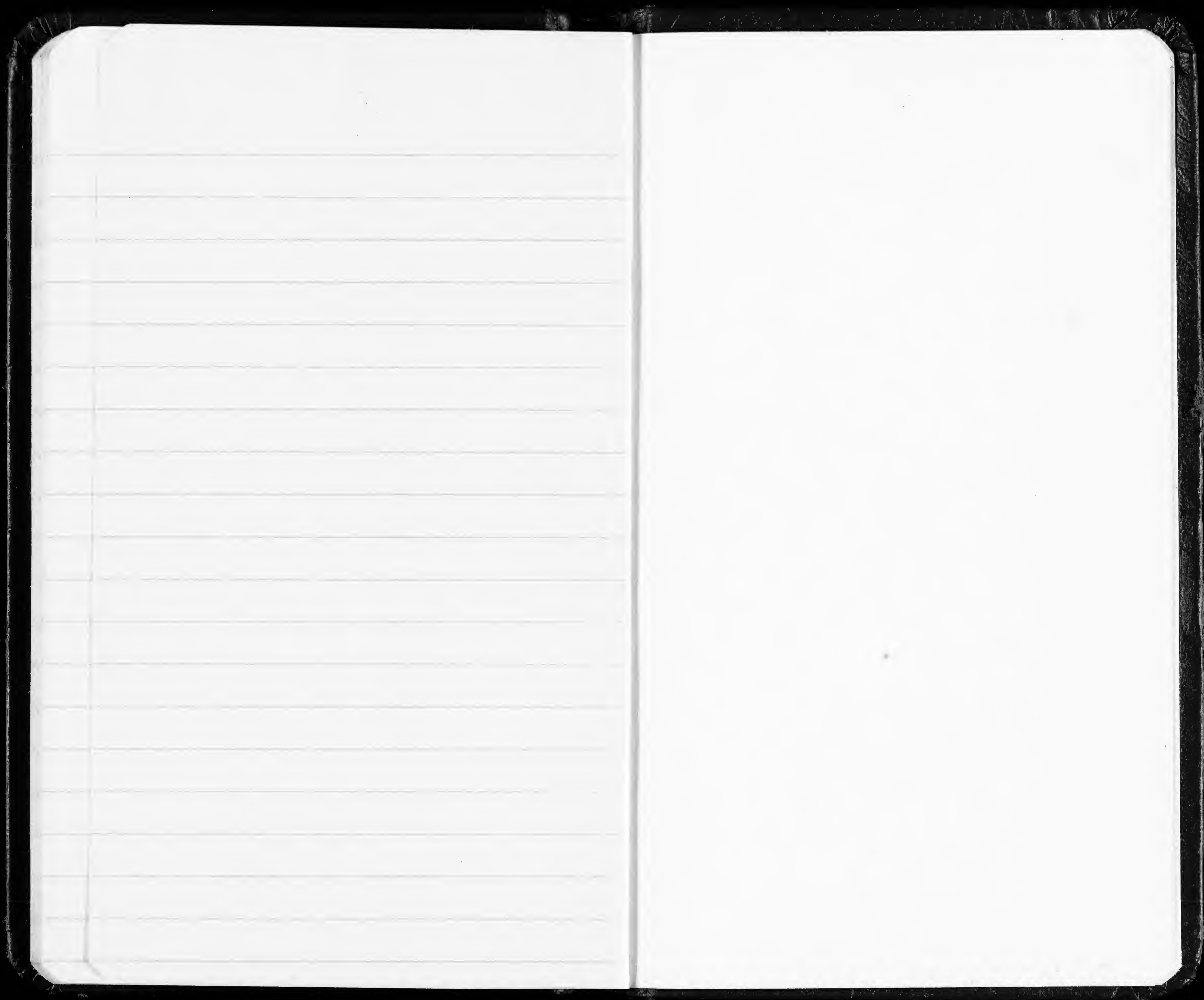
♀ Frigate bird chasing BFB  
Bater - 2m in off shore  
booby came from island  
and had no food. went into  
H<sub>2</sub>O to escape Frigate

♀ Lesser Frigate chasing BFB similar  
to above

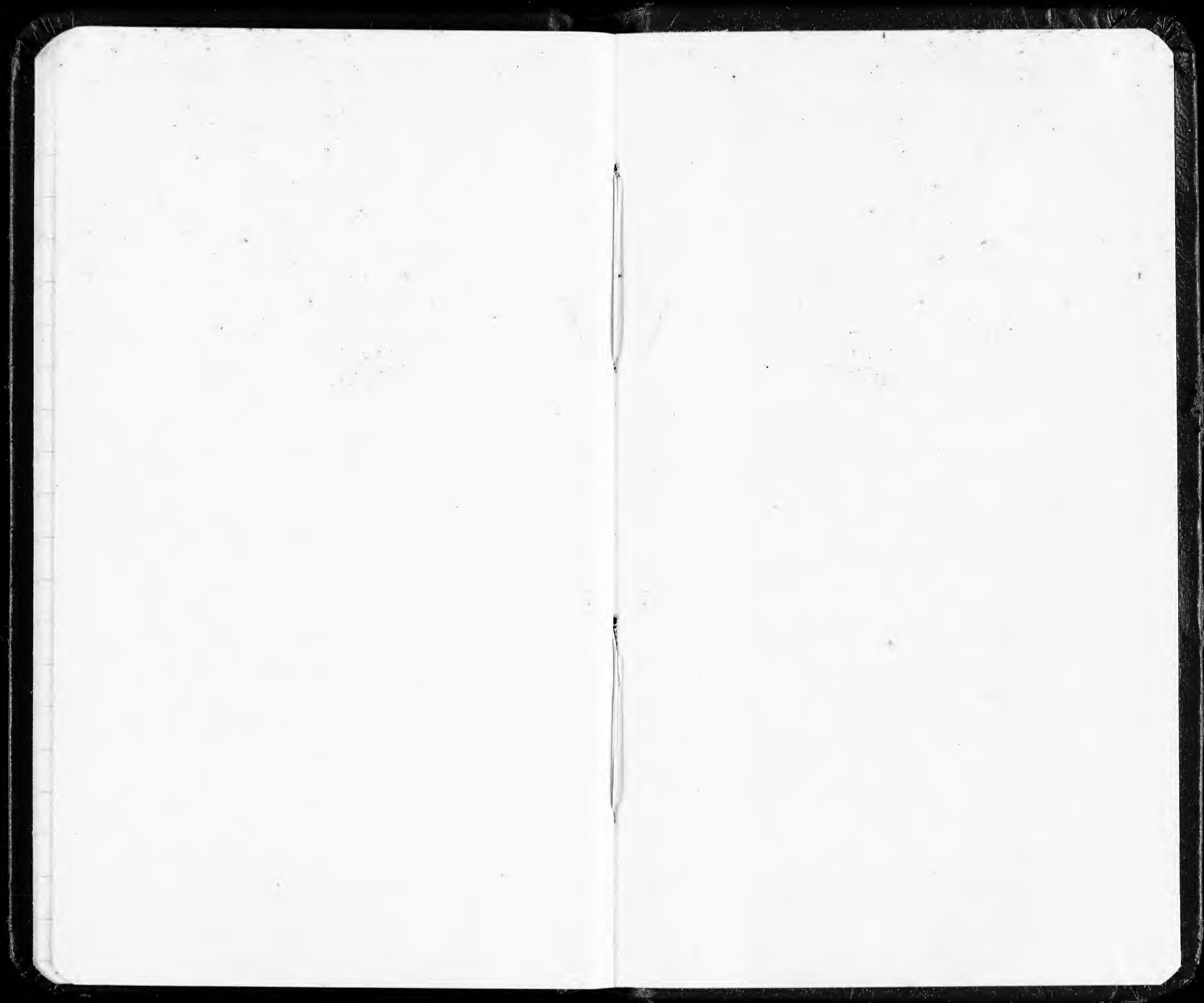












7530-222-0078  
FEDERAL SUPPLY SERVICE